## ABSTRACT

There is disclosed a chiral phosphine compound of formula (1):

$$Ar$$
 $Ar$ 
 $Ar$ 
 $Ar$ 
 $Ar$ 
 $R_1$ 
 $R_2$ 
 $Ar$ 
 $R_2$ 

The chiral phosphine compound is suitably used to produce a transition metal complex that is useful as an asymmetric reaction catalyst.